

DETROIT DISTRICT U.S. ARMY CORPS OF ENGINEERS CELRE-EHW 477 MICHIGAN AVENUE DETROIT, MICHIGAN 48226

DECEMBER 2019 GREAT LAKES WATER LEVEL SUMMARY

LAKE SUPERIOR

Lake Superior is in its seasonal decline and dropped approximately 3 inches from November to December. The December level remained below its record high from 1985, but was 3 inches above its level from last year. Preliminary December water supplies were 5th highest on record, partly a result of above average temperatures, which likely led to enhanced runoff and reduced the amount of evaporation. Over the next month, Lake Superior's water level is expected to decline and meet its record high from 1986, continue declining through March, and begin its rise in April. Water levels are forecasted to remain above the long term average (LTA) levels by 12 to 15 inches through June. Compared to last year, water levels are forecasted to be 2 to 3 inches above last year in January and February, near levels of a year ago in March and April, and 3 to 4 inches below last year in May and June.

LAKE MICHIGAN-HURON

Lake Michigan-Huron continued its seasonal decline from November to December. The level of 581.53 feet was within an inch of its record high from 1986. Like Lake Superior, water supplies were well above average, and the net basin supplies (NBS) ranked 4th highest on record. Warmer than average temperatures contributed to increased runoff, especially in Wisconsin and Michigan. Likewise, evaporation was likely less than normal as a result of the warmer than average temperatures. Over the forecast horizon, water levels are projected to continue with their seasonal decline and start their seasonal rise from March to April. Over the forecast period, water levels on Michigan-Huron are expected to remain higher than their levels from last year, above LTA levels, and exceed records by 1 to 4 inches for each month.

LAKE ST. CLAIR

Lake St. Clair continued to decline into December, lowering an inch from November's monthly mean to a level of 576.38 feet. The level was 30 inches above its monthly LTA, 8 inches above its level of one year ago, and 5 inches below its December record high. The forecast for the lake is expected to be below record highs through April, and 1 and 4 inches below their provisional 2019 record highs for May and June.

LAKE ERIE

Lake Erie remained at its November level into December, at a level of 573.10 feet. This level was 27 inches above its monthly LTA, 3 inches above last year's level, and 8 inches below its December record high. In contrast to Lake Superior and Michigan-Huron, Lake Erie water supplies were well below normal, which can be partially explained by average precipitation and below average runoff. The current 6-month forecast indicates that Lake Erie will drop in the first month, and then begin its seasonal rise from February through June. The levels are expected to persist above the levels that they were last year, by 1 to 4 inches in the first four months, and be 4 to 7 inches below their provisional record highs from 2019 in May and April.

LAKE ONTARIO

Lake Ontario declined from November to December, and was 11 inches higher than it was the previous December, 19 inches above the LTA, and 8 inches below its record high. Going into January, the lake level is forecasted to begin its seasonal rise, and exceed the levels that they were last year. Over the forecast horizon, levels are expected to be 2 to 8 inches higher than they were last year for the first 4 months, and 15 to 23 inches below levels from last year in May and June.